NEW SPECIES OF NEW YORK CADDISFLIES

By Charles K. Sibley

The four new species named below were all taken in the Lloyd-Cornell Reservation near McLean, N. Y. Descriptions are here offered in order that the names may be included in the *List of New York Insects* that is now nearing publication.

Rhyacophila gordoni new species.

Length to tip of wings-10 mm.

Head ferruginous; front with mostly stiff black hairs and a few white ones; vertex mostly with white hairs. Antennæ with basal segment ferruginous, clothed with long black hairs; the succeeding five segments pale and the remaining segments fuscous, annulate with pale at both ends of segments; color becoming darker towards distal end of antennæ. Palpi ferruginous above, paler beneath; second segment swollen internally and clothed above with long stiff black hairs.

Thorax ferruginous above; ferruginous marked with yellow below. Legs with coxe fuscous on outer surface, yellow within; other segments yellow clouded with dusky, sparsely covered with short black hairs. Short yellow spines present especially on last pair of legs. Femora of the mesothoracic legs with longitudinal fuscous stripe on the lower surface. Fore wings fuscous with ferruginous veins; costa and subcosta pale; stigma distinct; crossveins white; a small triangular white spot on mediocubital crossvein; a white spot in each of the apical cells near the wing margin. Hind wings tinged with fuscous; apex somewhat darker; stigma distinct.

Holotype—male in alcohol, taken at Inlet Brook, McLean, N. Y., Sept. 13, 1924.

Allotype—female in alcohol, taken at Inlet Brook, McLean, N. Y., Sept. 13, 1924.

Paratypes—male and female in alcohol, taken at Inlet Brook, McLean, N. Y., Sept. 10, 1924.

Agapetus minutus new species.

Length of body-3.8 mm.

Length to tip of wings-4.3 mm.

Head fuscous; vertex with two pairs of yellowish warts. Antennæ with first two segments yellowish brown; remaining segments brown, lighter

toward tip. Palpi brown, all segments short; segments of labial palpi of about equal length.

Thorax reddish brown. Legs brownish yellow. Fore wings dark brown, shining; a narrow white spot on media where it forks; tip of Sc and cross-vein r-m white. Hind wings smoky.

Abdomen reddish brown; a stout short backward projecting spine in center of seventh abdominal sternite.

Holotype—male in alcohol, taken at Inlet Brook, McLean, N. Y., Sept. 13, 1924.

Triaenodes marginata new species.

Length of body—male, 6.66 mm.; female, 7.6 mm.

Length to tip of wings-male, 9 mm.; female, 9 mm.

Length of palpi-male, 4 mm.; female, 4.66 mm.

Length of antennæ-25 mm.

Head yellow with white hair; a light brown wart bearing brown hairs at the inner margin of each eye. Basal segment of antennæ yellow, other segments white; basal half of antennæ narrowly annulate with black at base of each segment. Fore wings long and rather narrow; color reddish brown with golden hairs except for three large yellow spots covered with yellow hairs and located as follows: one on the central third of the costal margin, extending on the wing nearly to media; a band along the hind margin extending from the base of the wing to near the middle; a shorter band on the hind margin at about the level of the anastomosis. Posterior half of anastomosis white. The two spots on the hind margin of each wing come together when the wings are folded, giving the appearance of a dorsal stripe of yellow interrupted by brown. A short fringe of yellow hairs on the outer and hind margins. Hind wings white with yellow hairs. Palpi long, densely clothed with rather short brown hair; last segment longer than any other, flexible.

Thorax yellow with white hair. Legs pale yellow, clothed with dense white pubescence.

Abdomen yellow to yellowish green in dried specimens. In alcoholic specimens white, sometimes with a black spot on the sides of abdominal segments 4 and 5. The female genitalia are of the type common to the genus.

Holotype—male in alcohol, Mud Pond, McLean, N. Y., July 24, 1924.

Allotype—female in alcohol, Mud Pond, McLean, N. Y., July 24, 1924.

Paratypes—a series of pinned and alcoholic specimens taken at McLean and at Ithaca, N. Y.

Halesus dan new species.

Length of body-10 mm.

Length to tip of wings-18 mm.

Head, antennæ and palpi yellow with ferruginous hairs. Legs yellow with black spines; spurs yellow. First two segments of fore tarsi with a longitudinal black stripe on ventral surface.

Thorax and abdomen yellow. Fore wings yellow to brownish yellow. Three rows of fuscous spots as follows: innermost row—beginning with a spot in center of discoidal cell and continuing to hind margin of the wing; a row just beyond the anastomosis consisting of five small spots, one each in cells R3 to M2; a distal row beginning with a stripe in cell R4 half the length of that cell, and continuing along outer margin to hind margin where it joins the innermost row of spots.

The general color of this species is lighter than that of *H. guttifer* and the genitalia are distinctive.

Holotype—pinned male, The Shack, McLean, N. Y., Sept. 21, 1924.

Allotype—pinned female, The Shack, McLean, N. Y., Sept. 22, 1924.

Paratypes—a series of pinned specimens.